

MICROMACHINED LYSING DEVICE AND METHOD FOR PERFORMING CELL LYSIS

Abstract of Disclosure

A method and device for performing lysing on a cell-containing fluid, in which the fluid flows through a vibrating micromachined tube to physically rupture the cell walls (mechanical lysis), and/or to mix, agitate or homogenize the fluid during chemical lysis, and/or to mix, agitate or homogenize the lysate for analysis or other processing after lysing. The tube includes a freestanding portion spaced apart from a surface of a substrate on which the tube is formed. The device further includes means for vibrating the freestanding portion of the tube at a level sufficient to rupture the walls of cells in a fluid flowing through the freestanding portion (for mechanical lysing) or to mix the fluid and a chemical lysing additive within the freestanding portion (for chemical lysing).

Figures

Figure 1: A line graph showing the relationship between the number of hours spent studying and the score on a test. The x-axis represents 'Hours Studied' (0 to 10) and the y-axis represents 'Test Score' (0 to 100). The data points are as follows:

Hours Studied	Test Score
0	50
1	55
2	60
3	65
4	70
5	75
6	80
7	85
8	90
9	95
10	100

The graph shows a positive linear relationship, indicating that as the number of hours spent studying increases, the test score also increases proportionally.